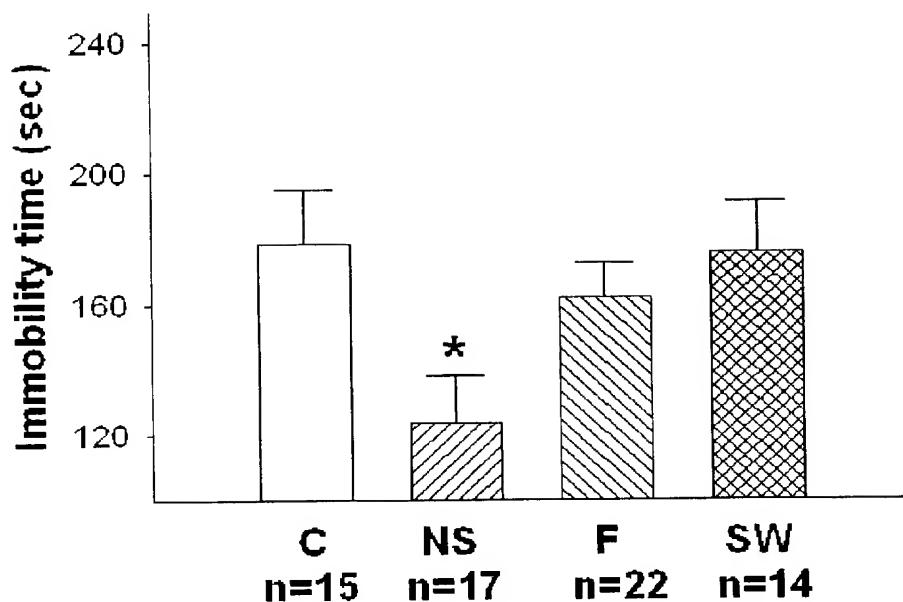


[Fig. 1]

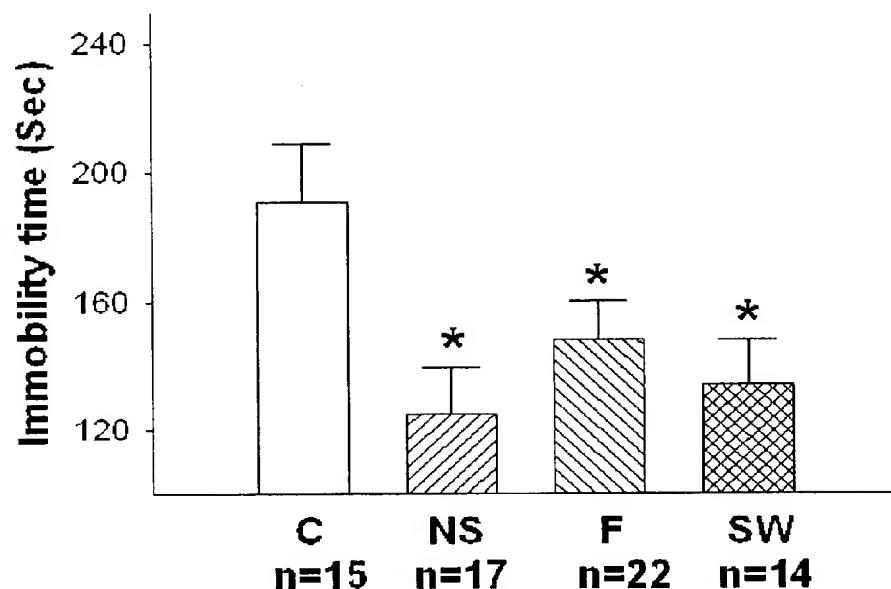


C: Control group, NS: *Nelumbo nucifera* Semen treatment group

F: Fluoxetine treatment group, SW: *Hypericum perforatum* treatment group

\* P < 0.05 versus control group

[Fig. 2]

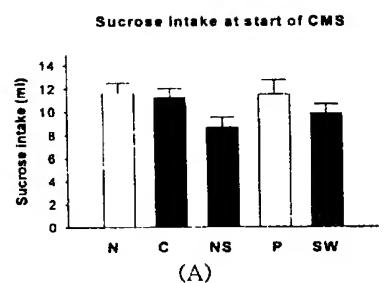


C: Control group, NS: Nelumbinis Semen treatment group

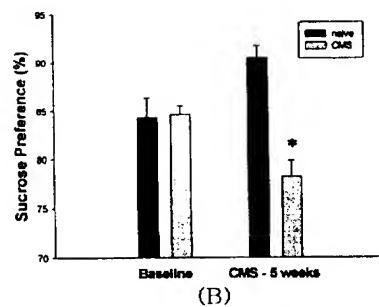
P: Fluoxetine treatment group, SW: Hypericum perforatum treatment group

\* P < 0.05 versus control group

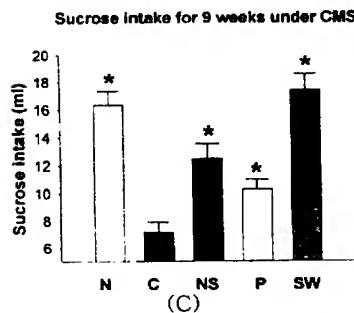
[Fig. 3]



(A)



(B)



(C)

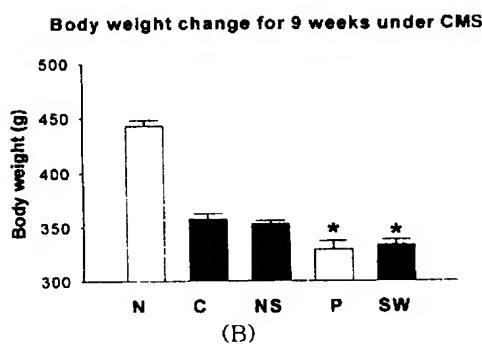
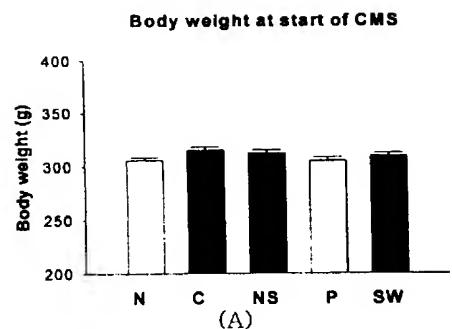
N: Normal group not exposed to CMS, C: Control group exposed to CMS

NS: Nelumbinis Semen treatment group, P: Fluoxetine treatment group

SW: Hypericum perforatum treatment group

\* P < 0.05 versus control group or normal group

[Fig. 4]

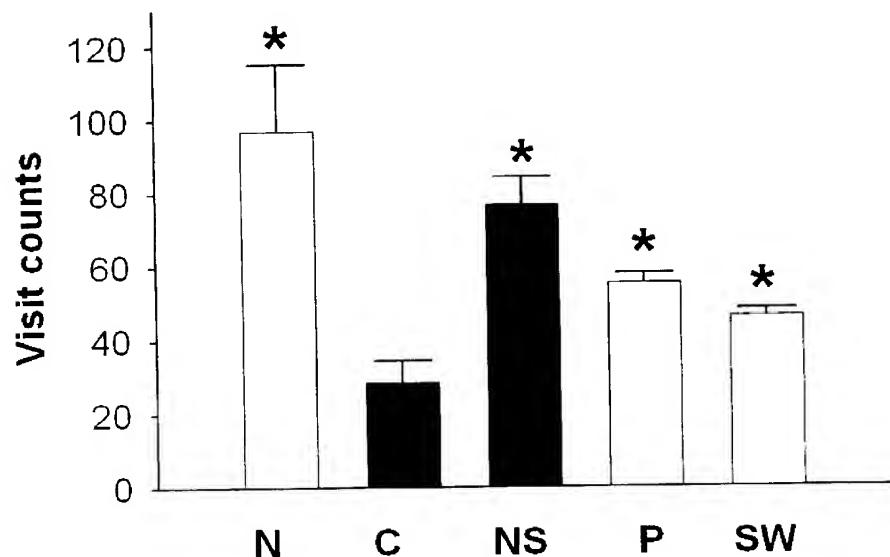


N: Normal group, C: Control group, NS: *Nelumbinis Semen* treatment group

P: Fluoxetine treatment group, SW: *Hypericum perforatum* treatment group

\* P < 0.05 versus control group

[Fig. 5]

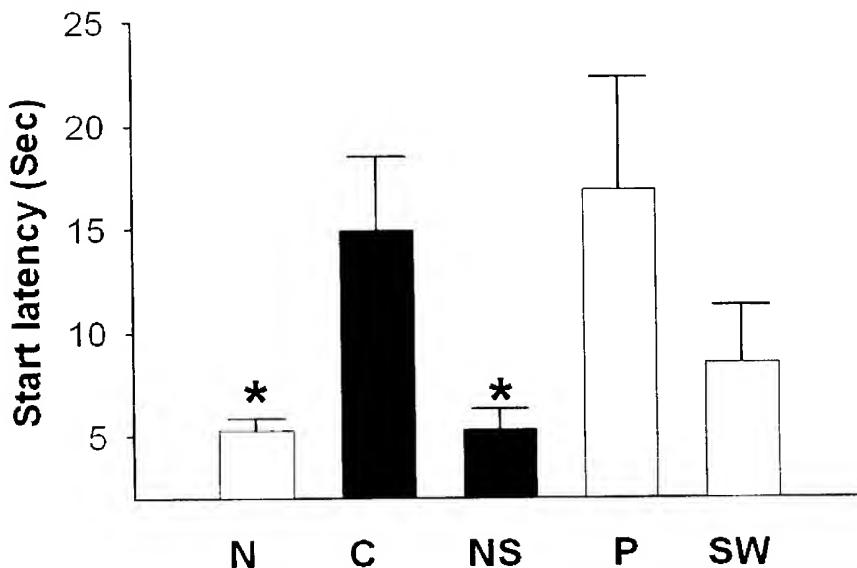
**Visit counts in open field test**

N: Normal group, C: Control group, NS: Nelumbinis Semen treatment group

P: Fluoxetine treatment group, SW: Hypericum perforatum treatment group

\* P &lt; 0.05 versus control group

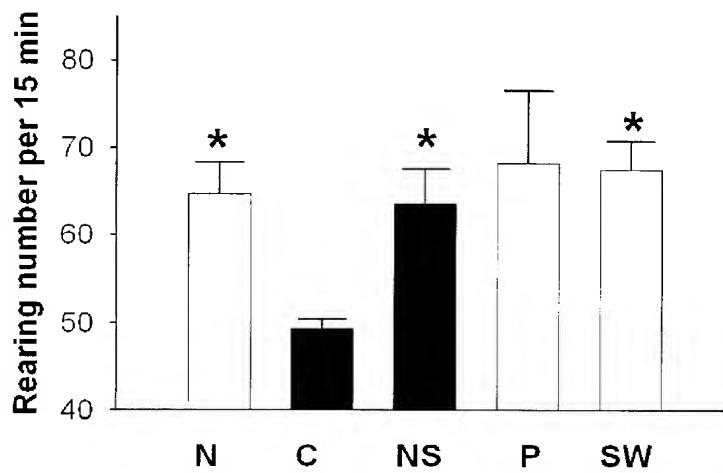
[Fig. 6]

**Start latency in open field test**

N: Normal group, C: Control group, NS: Nelumbinis Semen treatment group

P: Fluoxetine treatment group, SW: Hypericum perforatum treatment group

\* P &lt; 0.05 versus control group

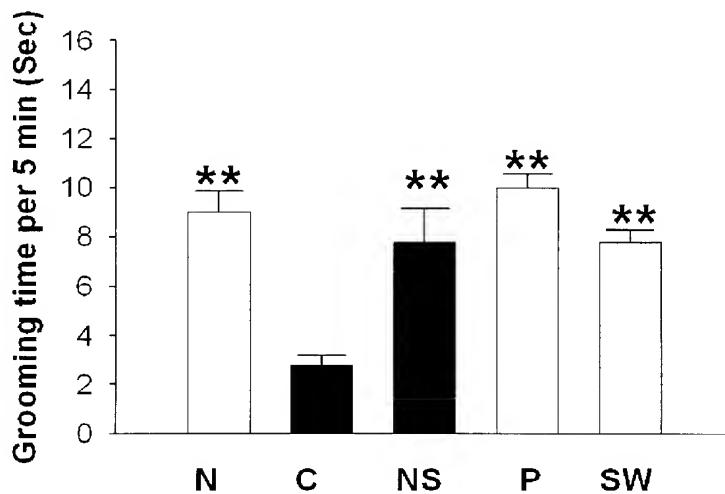
[Fig. 7]  
**Rearing in open field test**

N: Normal group, C: Control group, NS: Nelumbinis Semen treatment group

P: Fluoxetine treatment group, SW: Hypericum perforatum treatment group

\* P &lt; 0.05 versus control group

[Fig. 8]  
**Grooming time in open field test**

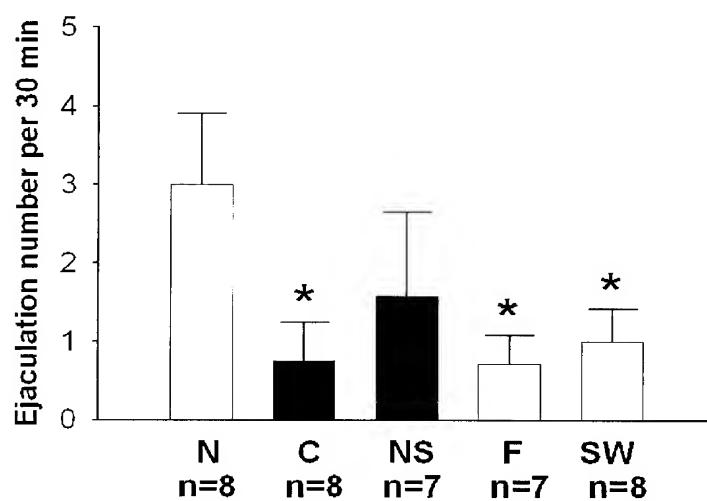


N: Normal group, C: Control group, NS: *Nelumbinis Semen* treatment group

P: Fluoxetine treatment group, SW: *Hypericum perforatum* treatment group

\* P < 0.01 versus control group

[Fig. 9]  
**The effect of *Nelumbinis Semen* on sexual behavior**

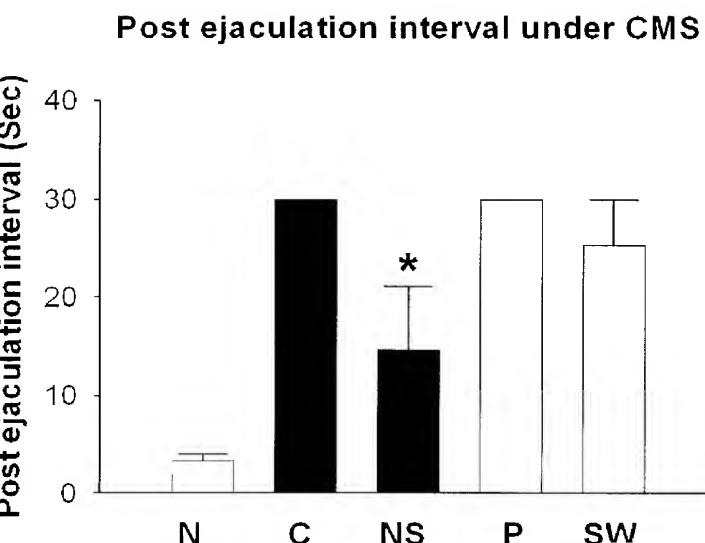


N: Normal group, C: Control group, NS: *Nelumbinis Semen* treatment group

P: Fluoxetine treatment group, SW: *Hypericum perforatum* treatment group

\* P < 0.05 versus normal group

[Fig. 10]

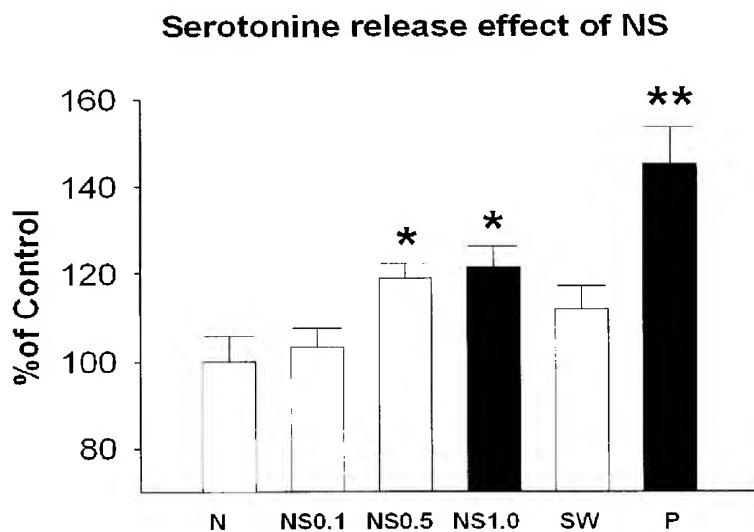


N: Normal group, C: Control group, NS: Nelumbinis Semen treatment group

P: Fluoxetine treatment group, SW: Hypericum perforatum treatment group

\* P < 0.05 versus normal group

[Fig. 11]



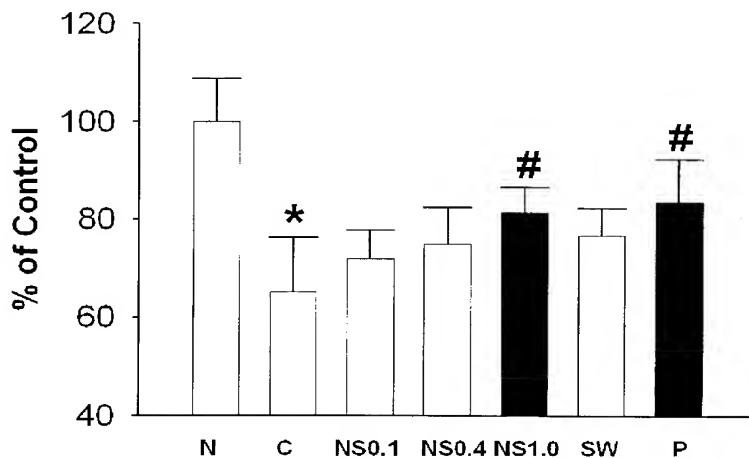
N: Normal group, C: Control group, NS: Nelumbinis Semen treatment group

P: Fluoxetine treatment group, SW: Hypericum perforatum treatment group

\* P < 0.05 versus normal group, \*\* P < 0.01 versus normal group

[Fig. 12]

## Serotonine release of NS under CMS



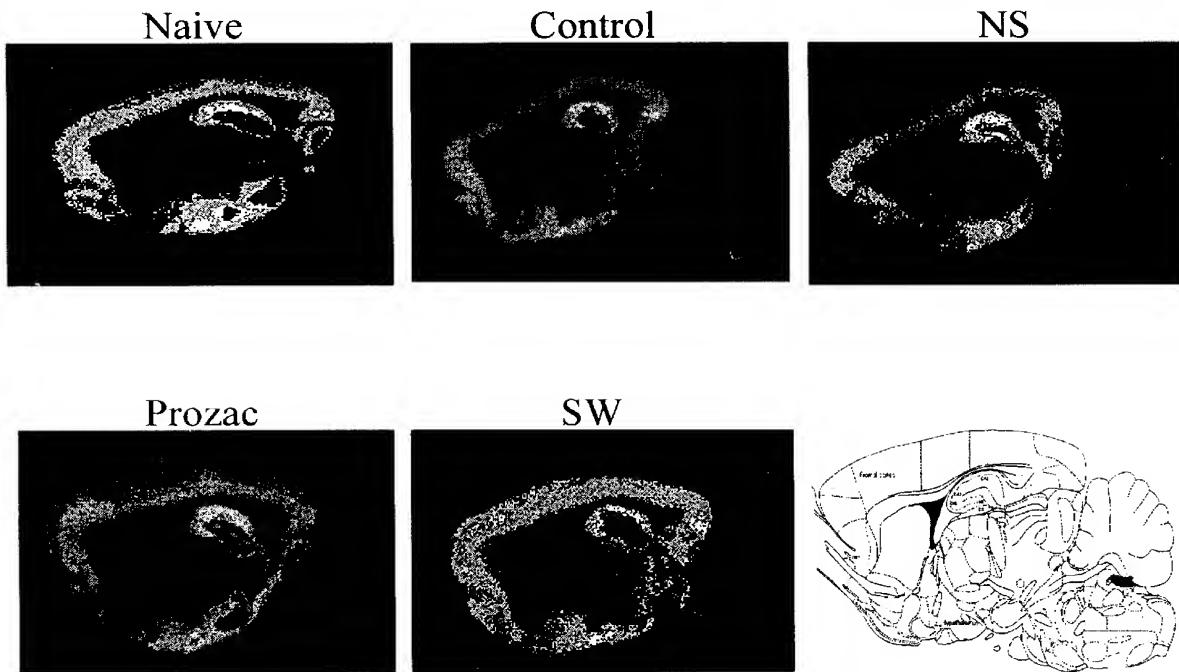
N: Normal group, C: Control group, NS: *Nelumbinis Semen* treatment group

P: Fluoxetine treatment group, SW: Hypericum perforatum treatment group

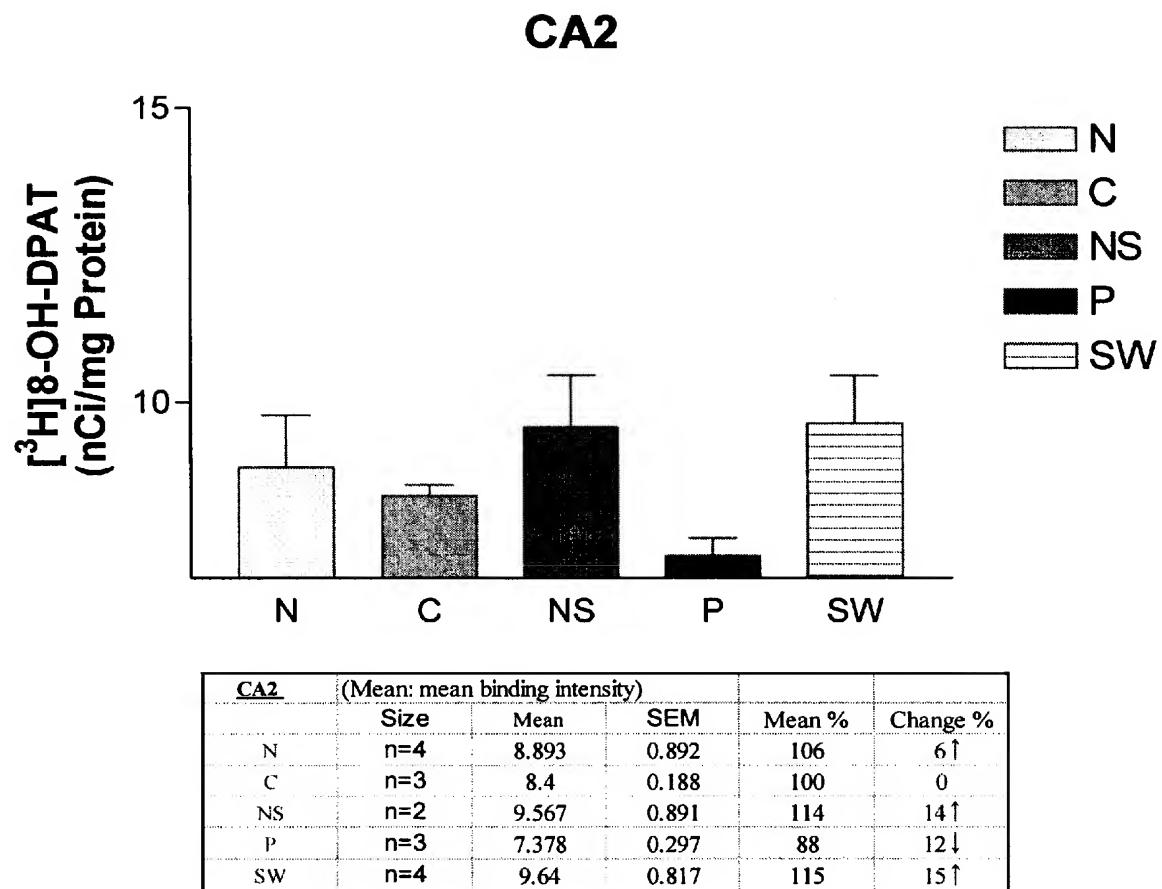
\*  $P < 0.05$  versus normal group, #  $P < 0.05$  versus control group

[Fig. 13]

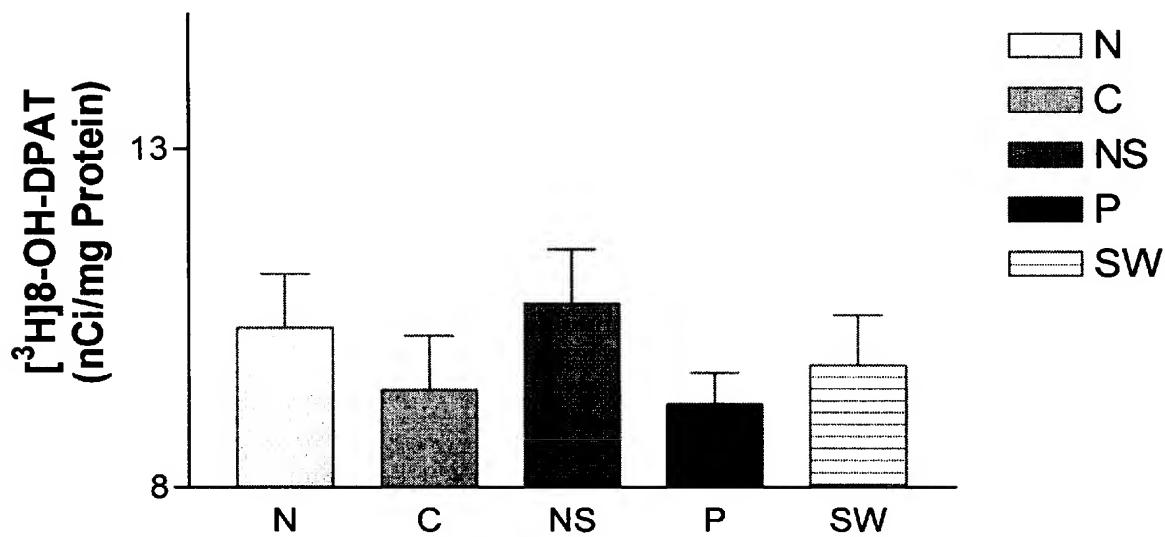
## Receptor Binding : $[^3\text{H}]8\text{-OH-DPAT}$ Autoradiography



[Fig. 14]

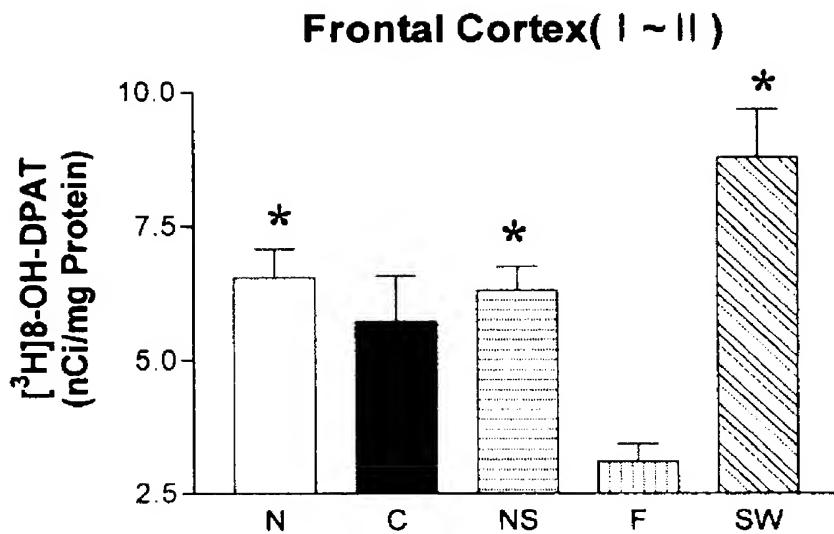


[Fig. 15]

**CA3**

CA3	(Mean: mean binding intensity)				
	Size	Mean	SEM	Mean %	Change %
N	n=4	10.351	0.806	110	10↑
C	n=3	9.425	0.81	100	0
NS	n=4	10.708	0.813	114	14↑
P	n=3	9.216	0.462	98	2↓
SW	n=4	9.795	0.747	104	4↑

[Fig. 16]



Frontal cortex (I-II)		(Mean: mean binding intensity)			
Size	Mean	SEM	Mean %	Change %	
N	n=4	6.553	0.537	115	15↑
C	n=3	5.711	0.865	100	0
NS	n=4	6.314	0.451	111	11↑
P	n=3	3.09	0.323	54	46↓
SW	n=4	8.773	0.908	154	54↑

N: Normal group, C: Control group exposed to CMS

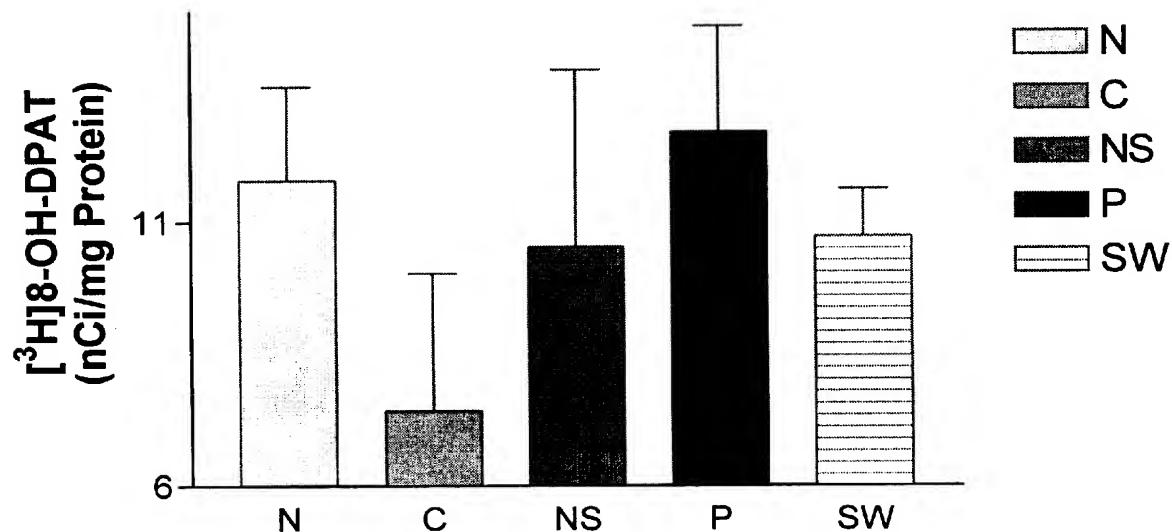
NS: Nelumbinis Semen treatment group, P: Fluoxetine treatment group

SW: Hypericum perforatum treatment group

\* P < 0.05 versus fluoxetine treatment group

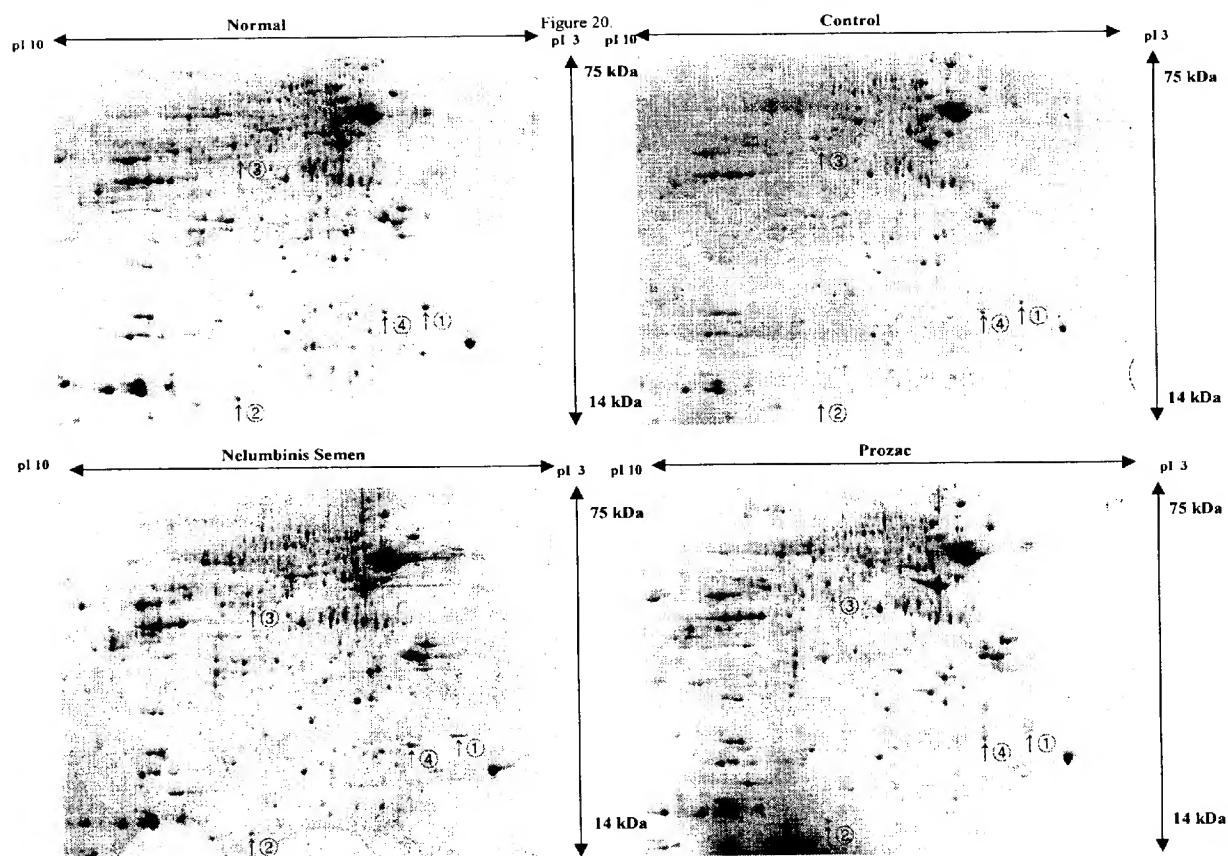
[Fig. 17]

## Hypothalamus



<u>Hypothalamus</u>		(Mean: mean binding intensity)			
	Size	Mean	SEM	Mean %	Change %
N	n=4	11.793	1.782	159	59↑
C	n=4	7.428	2.596	100	0
NS	n=2	10.526	3.367	142	42↑
P	n=2	12.701	2.021	171	71↑
SW	n=4	10.721	0.904	144	44↑

[Fig. 18]



[Fig. 19]

**The comparison of intensity of 4 spots in different treatment group**

<u>Spot 1-Adenylosuccinate synthetase</u>		(Mean: nor volume), n=3		
	Mean	SEM	Mean %	Change %
N	0.293	0.102	227	127 ↑
C	0.129	0.043	100	0
NS	0.207	0.063	160	160 ↑
P	0.032	0.012	25	75 ↓
<u>Spot 2-Cytochrome C oxidase</u>		(Mean: nor volume), n=3		
	Mean	SEM	Mean %	Change %
N	0.156	0.034	208	108 ↑
C	0.075	0.016	100	0
NS	0.166	0.025	221	121 ↑
P	0.123	0.025	164	64 ↑
<u>Spot 3-MAP kinase 2</u>		(Mean: nor volume), n=3		
	Mean	SEM	Mean %	Change %
N	0.068	0.012	139	39 ↑
C	0.049	0.019	100	0
NS	0.088	0.026	178	78 ↑
P	0.117	0.047	237	137 ↑
<u>Spot 4-Aldehyde dehydrogenase I</u>		(Mean: nor volume), n=3		
	Mean	SEM	Mean %	Change %
N	0.144	0.017	100	0
C	0.144	0.015	100	0
NS	0.172	0.037	119	19 ↑
P	0.091	0.025	63	37 ↓

N: normal, C: control, NS: Nelumbinis Semen, P: prozac (fluoxetin)